Alternative Buffer Design for Single Family Residential Lots

This buffer design may be used as a Department approved alternative BMP to meet either the General Standard or the Phosphorus Standard under the Chapter 500 Stormwater Management Rules, but only under the conditions described below. This design applies *only* to buffers adjacent to single family residential lot development where:

- The buffer is located immediately downhill of the developed area;
- Runoff enters the buffer as sheet flow without a level spreader; and
- The flow path over the portion of the developed area for which treatment is being credited does not exceed 150 feet.
- 1. **Slope:** To meet this alternative design, a buffer is not allowed on natural slopes in excess of 15%.
- 2. **Soil Restrictions:** Such a buffer is allowed on Hydrologic Soil Group D soils only if it is forested and non-wetland.
- 3. **Buffer Sizing:** The table below indicates the required buffer flow path length based on soil types and vegetative cover types. Buffers must be located downhill of the entire developed area for which they are providing stormwater treatment; and with no converging contour, such that all runoff from the developed area passes in sheet flow through the buffer for a distance at least as long as the required length of flow path.
- General Criteria: In addition, buffers must conform to the general design, construction and maintenance criteria described in Chapter 5 of Volume III of the ME DEP Stormwater BMP Manual.
- 5. **Minimum sizing for phosphorus standard:** If this buffer standard is being used to meet the phosphorus standard and its size is being adjusted to provide a specific treatment factor, the minimum sizing for this type of buffer is a flow path of 35 feet.

Required minimum length of flow path through the buffer Based on a slope no greater than 15%		
Hydrologic soil	For a forested buffer (feet)	For a meadow buffer (feet)
Α	35	50
В	45	60
C Loamy Sand or Sandy Loam	50	70
C Silt Loam, Clay Loam or Silty Clay Loam	70	100
D Non wetland	100	Not Applicable